

Amendments to the Claims:

Please amend claims 8, 11, 13, 14, 16, 17, 19 and 21 and cancel claims 1-7, 9, 10 and 23-25 as shown in the following listing of claims. This listing of claims will replace all prior versions and listings of claims in the application:

1-7. (cancelled)

8. (currently amended) A method for providing a gain ~~to be generated by a gain control device located in at least one signal path of the system~~ for a communication signal, the method comprising the steps of:

receiving a signal with an echo canceller device ~~in the signal path~~;

generating echo ~~canceller~~ performance information comprising at least an echo return loss (ERL) portion and an echo return loss enhancement (ERLE) portion;

summing the ERL and the ERLE to form a combined loss rate; and

~~sending the performance information to a gain control device in the signal path, wherein the performance information is used to generate a gain limit that is maximized in light of the information of the gain control~~ adjusting a gain to be provided to the signal based on the combined loss rate.

9-10. (cancelled)

11. (currently amended) The method of Claim ~~10~~ 8, wherein the step of generating the echo performance information includes utilizing a peak power estimator to provide the peak power for the tail end of a block of samples.

12. (original) The method of Claim 11, wherein the step of generating the echo performance information includes utilizing a window power estimator to provide power estimate over a sliding area of a certain number of previous blocks and a certain number of current blocks.

13. (currently amended) The A method of ~~Claim 9~~, providing a gain for a communication signal, the method comprising:
receiving a signal with an echo canceller device;
~~wherein the step of~~ generating echo performance information ~~includes~~ utilizing a ~~near end~~ near-end detector[[,]]; adjusting a gain to be provided to the signal based on the echo performance information;
and
setting the near-end detector to a certain time period if certain conditions are satisfied, said conditions including:
the ~~far-end~~ far-end window power being greater than a set level;
the ~~near-end~~ near-end window power being greater than the peak power of the far end; and
the window power after the echo canceller ~~to be~~ being within a certain amount of the window power before the echo canceller.

14. (currently amended) The method of Claim 13, wherein the ~~near-end~~ time period of the near-end detector is set to around 250 msec.

15. (original) The method of Claim 13, wherein the set level is around -36 dBm, and the certain amount is around 3 dB.

16. (currently amended) The method of Claim 13, wherein if any of the conditions are not satisfied, ~~then~~ a hangover counter is set to a maximum value if a tonal signal is detected on the egress path, and decremented otherwise if greater than zero.

17. (currently amended) ~~The A method of Claim 9, providing a gain for a communication signal, the method comprising:~~
receiving a signal with an echo canceller device;
~~wherein the ERL estimate includes the steps of:~~
determining a long term echo return loss (ERL) level;
determining a short term ERL estimate;
determining a first long term ERL estimate ERL_{lt};
determining a second long term ERL estimate ERL_c; and
~~denoting the ERL estimate as~~ adjusting a gain to be provided to the signal based at least in part on the larger of ERL_{lt} and ERL_c.

18. (original) The method of Claim 17, wherein the first long term ERL estimate is equal to the shorter term ERL estimate filtered through a first order infinite impulse response filter having a certain coefficient.

19. (currently amended) ~~The A method of Claim 17, providing a gain for a communication signal, the method comprising:~~
receiving a signal with an echo canceller device;
~~wherein the ERLE estimate includes the steps of:~~
determining a long term echo return loss enhancement (ERLE) level;
determining a short term ERLE estimate;
determining a first long term ERLE estimate ERLE_{lt};
determining a second long term ERLE estimate ~~ERLE_{lt}~~ ERLE'_{lt}; and
~~denoting the ERLE estimate as~~ adjusting a gain to be provided to the signal based at least in part on the larger of ERLE_{lt} and ERLE'_{lt}.

20. (original) The method of Claim 19, wherein the first long term ERLE estimate is equal to the shorter term ERLE estimate filtered through a first order infinite impulse response filter having a certain coefficient.

21. (currently amended) The method of Claim ~~10~~ 8, wherein a maximum gain is determined by the steps of:

- subtracting an offset from the combined loss rate to form a gain quantity;
- determining a maximum gain that will still provide stability for the system;
- setting the gain control device gain to the lesser of gain quantity and the maximum gain.

22. (original) The method of Claim 21, wherein the offset is approximately 6 dB, and the maximum gain is approximately 24 dB.

23-25. (cancelled)